UNITED STATES DISTRICT COURT MIDDLE DISTRICT OF TENNESSEE NASHVILLE DIVISION

| BRIAN A., et al. |) |
|---------------------|---------------------------------|
| Plaintiffs, |) Civ. Act. No. 3:00-0445 |
| |) Judge Todd J. Campbell |
| v. |) Magistrate Judge Joe B. Brown |
| |) |
| BILL HASLAM, et al. |) |
| |) |
| Defendants. |) |

NOTICE OF FILING OF THE REPORT OF THE BRIAN A TECHNICAL ASSISTANCE COMMITTEE UPDATE ON DEVELOPMENTS RELATED TO THE TFACTS EVALUATION FINDINGS AND RECOMMENDATIONS

Defendants, by their undersigned counsel, give notice of the filing of the Report of the *Brian A* Technical Assistance Committee, Update on Developments Related to the TFACTS Evaluation Findings and Recommendations, dated September 17, 2013.

DATED: Nashville, Tennessee

September 17, 2013

Respectfully Submitted,

ROBERT E. COOPER Attorney General & Reporter

/s/ Martha A. Campbell
MARTHA A. CAMPBELL (TN BPR #14022)
Deputy Attorney General
General Civil Division
P.O. Box 20207
Nashville, TN 37202
(615)741-6420

/s/ Jonathan P. Lakey JONATHAN P. LAKEY (TN BRP #16788) PIETRANGELO COOK, PLC 6410 Poplar Avenue, Suite 190 Memphis, TN 38119 (901) 685-2662

CERTIFICATE OF SERVICE

I hereby certify that on this 17th of September, 2013, a true and exact copy of the foregoing has been forwarded by the Court's Electronic Filing System to:

Marcia Robinson Lowry Ira Lustbader Melissa Cohen CHILDREN'S RIGHTS, INC. 330 Seventh Avenue, 4th Floor New York, NY 10001

David L. Rayburn HOLLINS, RAYBIN AND WEISSMAN, P.C. Suite 2200, Fifth Third Center 424 Church Street Nashville, TN 37219

Jacqueline B. Dixon WEATHERLY, MCNALLY AND DIXON, P.L.C. Suite 2260 424 Church Street Nashville, TN 37219

Richard B. Fields Attorney at Law 688 Jefferson Avenue Memphis, TN 38105

Robert Louis Hutton GLANKLER BROWN, PLLC Suite 1700, One Commerce Square Memphis, TN 38103

Wade V. Davies RITCHIE, DILLARD AND DAVIES 606 W. Main Street, Suite 300 Knoxville, TN 37902

/s/ Martha A. Campbell
MARTHA A. CAMPBELL

REPORT OF THE BRIAN A. TECHNICAL ASSISTANCE COMMITTEE

UPDATE ON DEVELOPMENTS RELATED TO THE TFACTS EVALUATION FINDINGS AND RECOMMENDATIONS

September 17, 2013

TECHNICAL ASSISTANCE COMMITTEE

Steven D. Cohen Senior Fellow Center for the Study of Social Policy Washington, D.C.

Judith Meltzer
Deputy Director
Center for the Study of Social Policy
Washington, D.C.

Andy Shookhoff Attorney Nashville, TN

Paul Vincent Director Child Welfare Policy and Practice Group Montgomery, AL

SPECIAL CONSULTANT TO THE TAC

John Ducoff Flemington, NJ

TECHNICAL ASSISTANCE COMMITTEE STAFF

Colleen Gleason Abbott Michelle Crowley Jamie McClanahan Kelly Whitfield

I. Introduction

This document provides a brief update on the work that the Department of Children's Services (DCS) has done over the five months since the Technical Assistance Committee (TAC) issued the report of its evaluation of TFACTS (referred to hereafter as the April 2013 Report). This document has been prepared in anticipation of the Status Conference scheduled for September 19, 2013.

John Ducoff, the chair of the TAC's TFACTS Evaluation Team, has continued to work with the TAC to monitor the implementation of TFACTS-related improvements undertaken by DCS in response to the findings and recommendations of both the Department's own internal assessment and the external evaluations conducted by the TAC and others. Mr. Ducoff has continued to confer with DCS and to review relevant materials requested from and provided by the Department. On July 30, 2013, Mr. Ducoff spent a full day in Nashville meeting with the Department's information technology (IT), quality assurance, and program leadership and key staff. In addition, as encouraged by the Court, Mr. Ducoff has made himself available to the plaintiffs' counsel (including two face-to-face meetings, one in July and one in August) to provide updates and to respond to TFACTS-related questions and concerns.

Mr. Ducoff will be attending the Status Conference and is available to answer any questions related to this update and to participate in any TFACTS-related discussions that the Court deems appropriate.

The following discussion describes the Department's efforts to address each of the key findings in the April 2013 Report.

II. The Department's Information Technology Leadership Team

In its April 2013 Report, the TAC found that the Department had assembled, within the DCS Office of Information Technology (OIT), a capable and conscientious information technology leadership team to address the many system design and implementation challenges posed by TFACTS. The TAC also found that this team, with the support of key IT staff and external contractors, had made significant progress in addressing and overcoming implementation challenges posed by defects in the application, inadequate training, and insufficient early support.

_

¹ Under the recent reorganization, what had been the Office of Information Systems (OIS) was renamed the Office of Information Technology (OIT).

The Department has continued to build its capacity and strengthen its remedial work by hiring additional high-level IT technical management professionals and recruiting additional technical staff to support TFACTS.

The Department has recently hired a highly experienced technical manager, Jerry Jones, to serve as the Director of Application Management within OIT and oversee the team responsible for the TFACTS application. Mr. Jones had been one of the lead technical managers employed by Compuware, the manufacturer of Optimal J and the contractor retained by the Department to assess and remediate the OptimalJ concerns that had been identified within the TFACTS application. At the time that the Department entered into the contract with Compuware, Mr. Jones had already left Compuware to work with another company. Plaintiffs' IT expert had identified Mr. Jones as an IT consultant with unique Optimal J expertise and expressed concerns about the ability of Compuware, without the services of Mr. Jones, to understand and address the range of technical challenges associated with OptimalJ (as it had been adapted by another vendor and used by that vendor in the development and implementation of TFACTS). The Department mounted a significant recruitment effort to hire Mr. Jones. He brings to the Department not only a unique set of skills to address the OptimalJ concerns, but a breadth and depth of expertise relevant to the technical aspects of the entire TFACTS application. With the addition of Mr. Jones, the Department has significantly enhanced its internal ability to anticipate, identify, understand, and remediate any technical issues with TFACTS that may arise.

In addition to hiring Mr. Jones, the Department has added other IT resources, consistent with the recommendations in the April 2013 Report. Specifically, the Department has:

- hired an experienced project manager to build the Department's IT project management capacity;
- retained two technical consultants who have coding and development skills to supplement the Department's existing staff resources;
- hired a specialist in IT security to lead the Department's information security work, supervising the existing IT security staff and supporting the work that DCS and the Tennessee Office of Information Resources (OIR) have done to date; and
- expanded the programmatic expertise within OIT, by adding a former regional administrator who, having most recently served in the Department's Analytics Unit, brings to OIT a valuable combination of field perspective and familiarity with the Department's data and data analysis function.

The Department has also continued to contract with external vendors to increase its capacity to provide IT-related services. The Department has extended its contract with Compuware, the vendor who performed the OptimalJ assessment and remediation, in order to task Compuware with technical work involved in enabling TFACTS for use on tablet devices by case managers in the field. According to OIT, this initiative is a result of end user input that indicated that the ability to use TFACTS on tablets would significantly enhance their ability to execute their daily

tasks in a more effective manner. In addition to the mobile-technology related work, Compuware will also continue to provide staff to supplement the Department's internal IT fiscal-related software development work.

OIT has also contracted with Cadre5, a technology consulting company with significant experience in databases and data analytics. OIT envisions that Cadre5 will supplement the Department's reporting and analytics capability. OIT also is currently in the process of contracting with PYA, LLC, a technology consulting firm specializing in the data mining of unstructured data. OIT envisions that this capability will enable the mining of the significant volume of unstructured data contained in TFACTS (e.g., case recordings and notes). OIT intends this effort to provide for enhanced reporting on the work of DCS case managers and better insight into the day-to-day operations of the Department.

III. The Department's Progress Producing Accurate and Reliable Aggregate Data Regarding System Performance

The April 2013 Report contained two findings relevant to the Department's ability to produce timely and reliable data to demonstrate the Department's performance serving children and families.

First, the TAC affirmed that information available from individual TFACTS case files and from aggregate reports built from extracts of data from TFACTS, in combination with other sources of information, was sufficient to allow the TAC to meet its monitoring responsibilities, notwithstanding the fact that there remained a number of areas for which accurate aggregate data important to effective and efficient child welfare system management were not yet available.

Second, the TAC acknowledged progress in the development of aggregate reporting in specific areas that had not been available at the time the TAC issued its June 2012 Monitoring Report (referred to as "Appendix A Reports" because these areas of reporting were identified in Appendix A of the June 2012 Monitoring Report). As of April 2013, there were four areas of "Appendix A reporting" that were not yet available and/or had not been sufficiently validated by the TAC.

Consistent with these findings, the TAC was able to rely heavily on TFACTS aggregate data (including newly-available Appendix A reporting) in its June 2013 Monitoring Report, and for those Appendix A areas for which aggregate reporting was not available, there were satisfactory alternate methods relied on by the TAC to report on the Department's performance.

The Department has continued to work, in consultation with the TAC, on addressing the remaining areas of Appendix A aggregate reporting not yet available when the TAC completed its TFACTS evaluation in April.

A. CPS Case Manager Case Activity Report; Brian A. Caseload Compliance Report, and the Brian A. Caseload Supervision Report

These reports, which are intended to provide ongoing and accurate caseload reporting, are not yet complete. As noted in the April 2013 Report, the change from a system organized around a "child case" (as was TNKids, the predecessor system to TFACTS) to a "family case" adds a level of complexity to designing a caseload report. Much of that complexity stems from the need to be able to distinguish between and among the various DCS staff working with one or more members of the family—CPS investigators, assessment workers, case managers, supervisors, and others—some of whom may have primary case management responsibility for one or more of the children in the family and others who may be working with the family in some other capacity. The case assignment role designations currently in TFACTS do not align with the caseload reporting needs of the Department.

The Department has made significant progress on the comprehensive analysis of staff roles and responsibilities necessary to redesign the case assignment function in TFACTS. This analysis, capably spearheaded by the Department's Director of IT Customer Service Support, and involving thoughtful and thorough consultation with a broad range of field staff, now provides the Department with an approach to redesigning the case assignment function, which is a prerequisite to accurate automated caseload reporting.² This approach eliminates the broad assignment role of "Family Service Worker" which, because of its lack of specificity, was used excessively to designate many different types of work being done with a family instead of using more specific assignment roles that would more appropriately describe each individual type of work.

While the Department's current approach should address the problems with case assignment that have hindered the production of accurate caseload reporting as required by the Brian A. Settlement Agreement, there are still some areas that need to be fleshed out (including the specific roles needed for staff who work with resource homes, non-custody cases, and fiscal administration; how to redesign the "supervisor" assignment role; how to use the "primary caseworker" designation moving forward; and whether it would make sense at some point to transition to a system in which assignments are made to specific children within the family case).

³ Although the Department's plan does not yet address the use of the "supervisor" assignment roles in TFACTS, it appears that the Brian A. Supervision Caseload Report can be pulled from the supervision structure that exists "behind the scenes" in TFACTS currently, even prior to addressing the use of that role.

² This work, which is also relevant to other reporting needs beyond Brian A. caseload reporting, is one of the initiatives that the Management Advisory Committee (MAC) identified as one of the Department's key IT priorities at the July 25, 2013 meeting, discussed in more detail in Section VI below.

That remaining work, however, does not prevent the Department from implementing those case assignment changes that have been resolved and, once those changes to the TFACTS application have been made, moving forward with development and production of the aggregate *Brian A*. caseload reporting that those changes will allow.⁴

In the interim, as noted in the April 2013 Report, the Department has continued to track caseloads manually and the TAC has been able to draw on this manual tracking to meet the TAC's monitoring responsibilities. Over the past month, the Department, in collaboration with the TAC, has made further refinements to the manual tracking process to improve both the Department's ability to use the manual tracking process for internal management and the TAC's ability to use this manual tracking for monitoring and reporting on caseloads and supervisory workloads.

B. Time of filing of the TPR petition and Time from the filing of TPR to obtaining an order of guardianship

The Department, in consultation with the TAC, has continued to work on these reports. The Department's legal division is in the process of completing a "data cleaning" effort, focused on making sure that issues related to timely and accurate TPR activity data entry by legal division staff have been addressed. That data cleaning effort is expected to be complete by the end of October.

Pending completion of the data cleaning effort, the TAC monitoring staff have been working with the Department to clarify some of the parameters for the reporting, in order to address some of the problems with the design of the reports identified by monitoring staff as part of the report validation process.⁵ Within 30 days, the Department expects to produce a report, run with revised parameters, for a region which has completed its TPR data cleaning. This will allow the TAC monitoring staff to determine whether the problems with the report design have been addressed. Assuming that this single region report is validated and the data entry issues that are the focus of the data cleanup effort are resolved on schedule, accurate aggregate TPR data related to the TPR timelines should be available by December 2013.

As indicated in the April 2013 Report, the TAC was able to rely in its most recent monitoring report on data generated from targeted case file reviews to assess and report on the Department's performance on meeting the relevant TPR timelines referenced in the Settlement Agreement.

⁵ Some of the permanency goal date issues identified in these discussions have implications for other reports being worked on by other developers. It appears that there may be inconsistencies in the approaches taken by different developers to the "pulling" of permanency goal dates, and it will be important for OIT to understand how those inconsistent approaches arose, but were not identified and resolved, within the report developer team.

5

⁴ Additionally, it appears that it may be possible to produce reporting on CPS investigation and assessment caseloads, including the CPS CM Activity Report, prior to implementation of the case assignment redesign because it appears that the "Assessment/Investigation worker (A/I worker)" role is currently being used consistently to identify CPS investigators and assessment workers (and only CPS investigators and assessment workers).

The TAC will continue to do so until the validation of the TFACTS aggregate reporting on timeliness of the TPR process is complete.

C. CANS Data Extract and CANS High Risk Assessments

The Department was able to address some of the issues identified in the April 2013 Report related to the CANS Data Extract in time for the TAC to draw on that extract in its June 2013 Monitoring Report. The TAC monitoring staff have identified some additional issues related to both of these reports and are in the process of working through these issues with the IT developers, program staff, and staff from Vanderbilt University involved with the CANS. The Department anticipates that those issues will have been addressed by the end of October, and once that occurs, the TAC will be able to fully rely on the CANS reports as the aggregate data source for its monitoring of the timeliness of initial CANS completion. Those reports will also facilitate the TAC's monitoring of the CANS High Risk review process.

There remain some issues related to the failure of TFACTS to preserve some of the functions that had been integral parts of the original CANS web application implemented under TNKids. One result of this failure has been the loss of a notification function that allowed for better supervision of the CANS completion process by the CANS consultants. The other result was the loss of the "hover function" that served to remind those filling out the CANS of the key questions and considerations associated with each CANS element, which proved an effective way (much appreciated by the field) to help ensure the accuracy of the CANS assessments. 8

D. Diligent Search

Before the Department can produce helpful aggregate diligent search reporting, the TFACTS fields need to be modified to better support the data entry needs of the case managers responsible for carrying out and documenting their diligent efforts to locate parents and grandparents.

It appears that the program staff tasked with working with OIT on redesigning the diligent search fields have provided the OIT staff with all of the information that OIT has requested of them. That information was provided in December of 2012. At the present time, however, OIT reports that this work has not been prioritized by the Department's leadership (through the Management

_

⁶ The reporting was sufficient to support the TAC's finding that the Department was not yet in compliance with the two provisions for which the CANS data are relevant: VI.A.1.h (for which the CANS High Risk Review is a key element of the Department's approach to meeting the requirements of that provision); and VI.B. (for which the CANS is a key element of the standardized assessment protocol that is to be completed within 30 days of a child's entry into custody).

⁷ A non-IT staff member of the recently disbanded Analytics Unit had developed a "workaround" as a substitute for the loss of that function. However, it is not clear that this workaround will continue to be available going forward.

⁸ OIT reports that there are preliminary discussions underway regarding the scope of work involved to develop a replacement for both the notification and "hover" functions.

Advisory Committee process discussed in Section VI below). As a result, OIT has not yet focused resources on moving this work forward.

As discussed in the June 2013 Monitoring Report, the Department has been relying on periodic case reviews and on-going work by Central Office staff with the regions around diligent search to guide its efforts to improve practice in this area. The Department's current assessment is that diligent search practice is not yet meeting the requirements of the Settlement Agreement.

It is certainly important for the Department to move forward at some point to make it easier for field staff to document diligent search efforts, and aggregate reporting from TFACTS related to diligent search activities, once available, will no doubt be helpful, both for the Department's own internal management purposes and the TAC's monitoring purposes. However, the Department is not anticipating seeking to make the case for maintenance until the current documentation challenges have been addressed and until the aggregate data to support maintenance is available. And should the Department seek to establish maintenance before aggregate reporting is available or should the parties and/or the Court for any other reason wish the TAC to do so, the TAC is prepared to carry out an appropriate targeted case file review to provide the basis for further evaluating the Department's performance with respect to the diligent search requirement.

IV. Compliance with the Statewide Automated Child Welfare Information System (SACWIS) Requirements in the Settlement Agreement

As discussed in the April 2013 Report, the Settlement Agreement requires that the Department maintain a statewide computerized information system that:

- is accessible in all regional offices;
- ensures user accountability;
- uniformly presents the Adoption and Foster Care Analysis and Reporting System (AFCARS) elements;
- provides an immediately visible audit trail to the database administrators of all information entered, added, deleted or modified; and
- has necessary security to protect data integrity.

The April 2013 Report noted that the Department was working both to improve the audit trail function and to identify and address deficiencies in system security. Those efforts have continued.

7

⁹ The TAC recognizes that as helpful to the field as this redesign will be, there may be other enhancements that the field staff would prefer be given priority, including those discussed on page 15 below.

With regard to the audit trail, as noted in the April 2013 Report, the Department planned to build enhanced audit trail functionality into the redesigned data warehouse. While TFACTS as implemented contained audit trail functionality, it was limited; in this enhanced version, the data warehouse will make a record, in real time, of each and every time that data in the system are created, modified, or deleted. The record will include the previous state of the data, the current state of the data, who made the modification, and when it was made. The Department reported that this functionality will be "fully live" by the end of October. The TAC will continue to monitor the Department's progress on the deployment of this functionality going forward.

With regard to security, the Department has added a staff member who is a Certified Information Systems Security Professional (CISSP) to work on promulgating and implementing TFACTS security policies under the leadership of the Deputy Chief Information Officer. In addition, the Department:

- has requested that Tennessee's Office of Information Resources continue to conduct both vulnerability and penetration testing on the application to identify any areas of concern;
- is evaluating and plans to deploy its own security testing software to identify any potential vulnerabilities; and
- as noted above, has retained an information security technical consultant to supplement its efforts.

Those initiatives have validated much of the Department's approach to security, but have also identified security issues that the Department must continue to address going forward.¹⁰

Once the improved audit functionality and the enhanced approach to security have been implemented, the Department will meet all of the SACWIS system requirements of the Settlement Agreement.

V. Responding to the TFACTS Usability Issues Identified by Field Staff

As discussed in the April 2013 Report, the implementation of TFACTS provided insufficient attention to the needs of case managers and other end users for hands-on training and support. However, the TAC found that the Department had begun to address these issues through reorganized and proactive efforts both to help staff learn how to use the TFACTS system and to assist staff in navigating and solving problems.

_

¹⁰ As discussed below, several of the fixes and enhancements the Department implemented in TFACTS since the April 2013 Report address security issues.

A. Redesign of TFACTS Training

The April 2013 Report identified a number of deficiencies in TFACTS training (with which the Department agreed), including that the initial training:

- did not include providing staff with comprehensive "hands-on" experience with the system, instead relying on a trainer to show staff basic navigation only;
- was not adequately targeted to the various functional roles that staff have throughout the agency or to employees of private providers that also use the system;
- did not help staff understand the underlying rationale behind system functions;
- was disconnected from overall pre-service training, so that staff would participate in preservice training and then not be positioned to relate the training about their work to how to document that work in TFACTS; and
- did not proactively account for changes made to TFACTS.

Since the release of the April 2013 Report, the Department's TFACTS training staff has completed a number of initiatives designed to update and enhance TFACTS training. As noted in the report, the Department at that time had already restructured the training to better connect TFACTS training to pre-service training. Since then, the Department has:

- ensured that all training is "hands on" with TFACTS, rather than limited to showing staff basic navigation;
- reviewed all of the TFACTS training exercises to confirm and validate that they are correct and appropriate given the changes and enhancements made to TFACTS since initial implementation;
- reviewed all of the TFACTS "storyboard" training aides to ensure that they remain valid, relevant to the work, include updated and accurate screenshots from TFACTS, and follow the current workflows, again in light of all of the changes and enhancements made to TFACTS since implementation; and
- created a design guide to standardize the appearance of all training to ensure uniformity and consistency.

The Department has also piloted an approach to training that includes not only TFACTS trainers (*i.e.*, those familiar with how TFACTS operates), but also includes staff from the relevant area of program operations. Training on a system like TFACTS often raises questions about policy and practice, rather than how the system functions, so it can be very helpful to have a representative of the relevant program area in the training to address those questions. DCS has piloted this approach in connection with training on TFACTS health modules and intends to continue it as additional TFACTS enhancements are deployed. DCS also has plans to develop more role-based training, so that, for example, TFACTS training for someone hired into a case manager position will emphasize those areas of TFACTS that case managers regularly use and rely on in their

work, rather than including broad (but not deep) training on the entire system (including TFACTS screens and functions that case managers would rarely, if ever, be expected to use).

B. Improving Usability and Implementing Defect Fixes and Enhancements

The April 2013 Report contained two findings that relate to the challenges that TFACTS presented to case managers in the field. First, case managers continued to experience usability challenges with the system that impacted their ability to get their work done. Second, the Department had identified a number of defect fixes and necessary enhancements to the system (documented in the "All Defects" list) that required remediation. The usability challenges that were the cause of much of the worker frustration were often directly related to long-identified defects in the system and long-sought enhancements that were documented in the "All Defects" list. And many in the field perceived that the challenges and frustrations that they were experiencing were insufficiently appreciated by those setting IT priorities and that the related fixes and enhancements had not been given the priority attention that they deserved.

In the April 2013 Report, the TAC documented the results of a survey conducted with case managers regarding the user experience with TFACTS. In the survey, the primary identified challenges fell into one or more of the following categories: system performance issues, including being "kicked out of TFACTS" or the system responding slowly; difficulty printing and generating reports/forms from TFACTS; frustration with the cumbersomeness of the permanency plan module, especially in cases involving sibling groups, and the length and complexity of the printed plan that it creates; and TFACTS not being particularly user friendly in key respects, requiring multiple "mouse clicks" to move through the system and having some areas in which there is still some fragmentation of information and/or redundant data entry.

Since the April 2013 Report the Department has invested significant time and effort in listening directly to the concerns of case managers in the field. During that period the Department's Chief Information Officer and Deputy Chief Information Officer have visited DCS offices across the state to seek feedback from case managers and other field staff. The lessons learned from those conversations are reflected in the IT projects that have been given priority in the near term. The Department recognizes that attention to soliciting feedback from the field is important both to ensure that the issues that are the most salient for workers in the field are reflected in the Department's prioritization of TFACTS work and to show case managers in the field that information technology staff are actively listening and responding to their concerns.

1. Update on the "All Defects List"

As noted in the April 2013 Report, the Department maintains the "All Defects List," a cumulative list of all issues with TFACTS since even before its deployment in August 2010. In the April 2013 Report, the TAC analyzed and discussed the "All Defects List" as of February 28,

2013. The TAC has reviewed and compared the current version of the "All Defects List," as of September 13, 2013, with the February 28, 2013 list.

At the outset, it is worth noting that a list such as this will not necessarily show a decline in the total number of issues over time. As the Department continues to fix and enhance TFACTS and end users continue to enter data into the system, new issues, defects, and potential enhancements will be identified and documented in the list, appropriately increasing the overall total. The Department's progress in fixing defects and implementing enhancements is therefore best understood by reviewing "release notes" as discussed in subsection B.2 below.

The following table compares the "All Defects List" as of February 28, 2013 and as of September 13, 2013:

| "All Defects List" Status | | | | | | | | |
|--|-----------|-----------|------------|--|--|--|--|--|
| February 28, 2013 vs. September 13, 2013 | | | | | | | | |
| | 2/28/2013 | 9/13/2013 | Difference | | | | | |
| Total Items | 10,490 | 10,827 | 337 | | | | | |
| Closed | 8,777 | 9,395 | 618 | | | | | |
| Closed – Fixed | 7,928 | 8,340 | 412 | | | | | |
| Closed – Stale | 835 | 1,041 | 206 | | | | | |
| Closed – UTR | 9 | 9 | 0 | | | | | |
| Closed - Rejected | 5 | 5 | 0 | | | | | |
| Open/In Process | 1,713 | 1,432 | -281 | | | | | |
| Functionality | | | | | | | | |
| Defects | 606 | 368 | -238 | | | | | |
| Enhancements | 205 | 152 | -53 | | | | | |
| Data Issues | 805 | 798 | -7 | | | | | |
| Reports | | | | | | | | |
| Defects | 54 | 52 | -2 | | | | | |
| Enhancements | 43 | 46 | 3 | | | | | |
| Infrastructure | | 16 | 16 | | | | | |

As noted above, the total number of entries in the "All Defects List" increased by 337 as the Department identified additional defects in and necessary enhancements to TFACTS. The Department closed an additional 618 items during that period, 412¹¹ of which were closed as

¹¹ Often a particular issue will be called in by a number of end users experiencing it, leading to the creation of multiple entries on a list such as this. As a result, one fix or enhancement may effectively close multiple list entries.

fixed and 206 of which were closed as stale.¹² After those closures, there were 1,432 open entries remaining on the list, 281 less than on February 28, 2013.¹³

The Department categorized the open entries into those that relate to the application's functionality, data issues, reports, and, for the first time, infrastructure, which includes technical issues with the application that can impact performance but that are otherwise transparent to end users. The Department made the most progress on TFACTS functionality (closing a net of 238 defects and 53 enhancements). The Department's reporting shows minimal progress on data issues and reports, closing a net of seven and two defects respectively, and adding a net of three report enhancements.¹⁴

The Department also continues to categorize open list entries by priority, on a scale from 1 to 5 (with 1 as the most severe), as detailed in the table below:

.

¹² See April 2013 Report at page 46, footnote 57.

¹³ In the February 28, 2013 version of the "All Defects List," the Department categorized 515 entries as "Assigned" to staff to address (307) and in various stages of testing and deployment (208). Since then the Department has concluded that categorizing entries in that manner is not helpful and instead has decided to include those in the "Open" category. As a result, for purposes of this analysis the TAC has added those 515 entries back into the "Open" category.

¹⁴ OIT's tracking and documentation of the status of its TFACTS related work appears to be more comprehensive, up to date, and readily accessible for projects focused on improving the functionality of TFACTS than it is for those projects addressing data issues and reporting. OIT's Data Management Unit (DMU)—which is responsible for addressing data issues and reports—no longer uses the "All Defects List" (which, as noted in the April 2013 Report, comes from a software application known as "Track Record") as a tool to manage their work. Instead, according to OIT, the DMU uses a separate software application called Remedy. DMU leadership has indicated that the unit addressed the backlog of data issues (that is, corrections to data entry errors in individual cases) in full, and has for the past several months been able to address corrections immediately when they are received; however, the "All Defects List," as noted, does not reflect that progress, and the DMU has not provided the TAC with something comparable to what OIT has provided on application related work from the All Defects List. Whichever application is used to track the work, it is incumbent upon the Department to have some mechanism to provide comprehensive, readily accessible, and easily understood reporting on the status of work on all outstanding defects and enhancements pertaining to TFACTS, including those that are the responsibility of the DMU.

| Open TFACTS Issues, All Defects List, September 13, 2013 | | | | | | | | | |
|--|------------|--------------------|----------------|---------|--------------------|----------------|--------------------|--|--|
| Priority | Functional | | Data Issues | Reports | | Infrastructure | | | |
| | Defects | Change Requests | Defects | Defects | Change Requests | Defects | Change Requests | | |
| Priority – 1 | 0 | 0 | 80 | 0 | 0 | 0 | 0 | | |
| Priority – 2 | 0 | 0 | 6 | 0 | 0 | 0 | 0 | | |
| Priority – 3 | 290 | 43 | 607 | 39 | 13 | 9 | 1 | | |
| Priority – 4 | 77 | 57 | 11 | 13 | 25 | 5 | 1 | | |
| Priority – 5 | 1 | 52 | 0 | 0 | 8 | 0 | 0 | | |
| No Priority Indicated | 0 | 0 | 94 | 0 | 0 | 0 | 0 | | |

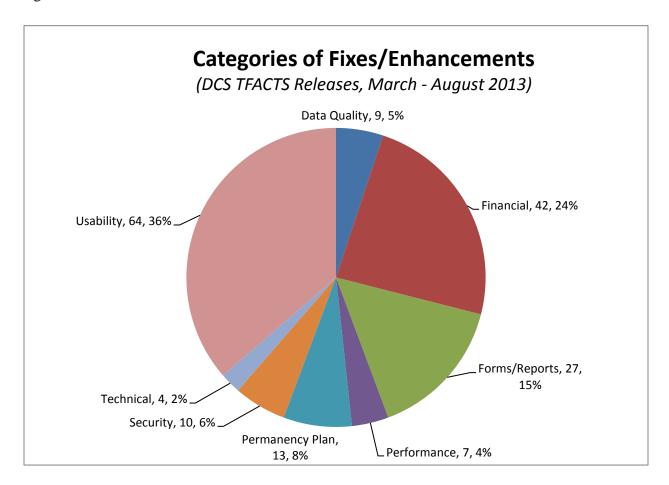
This reporting continues to indicate that the Department believes that the Priority-1 and Priority-2 issues have been resolved, with the exception of the data issues (which, as discussed above, the Department has indicated is the result of the DMU no longer documenting their work in this list).

2. Analysis of TFACTS Releases

The Department has implemented five sets of fixes and enhancements (known as "releases") to TFACTS since March of 2013. Each fix and enhancement relates to an identified defect or necessary enhancement on the "All Defects" list. The TAC has reviewed and analyzed the "release notes," which detail the issues addressed in each release, in order to assess the Department's progress working down the "All Defects" list from where it stood on February 28, 2013 as well as the progress the Department has made fixing and enhancing TFACTS to improve usability. The TAC review focused in particular on whether the Department's work has addressed issues in the key areas identified by case managers in response to the TAC's survey.

The five TFACTS releases from March 2013 to August 2013 included a total of 176 fixes and enhancements: 28 implemented on March 21, 2013; 52 on April 25, 2013; 57 on June 6, 2013; 20 on July 11, 2013; and 19 on August 8, 2013. The number of fixes and enhancements included in each release largely depends on the size and complexity of the work involved in each fix/enhancement. Those that are less complex require less work, such that more can be completed in a single release. The content of releases can be determined by priority and by the parts of the application that each involve; for example, if a priority fix or enhancement involves a particular area of the application, developers may choose to work on additional fixes or enhancements that are outstanding that involve the same area of the application.

A review of the specifics of each of the 176 fixes demonstrates that DCS has, for the most part, focused attention on those key issues identified by the field in response to the TAC's case As the figure below demonstrates, the single largest number of manager survey. fixes/enhancements (64) addressed concerns about usability, including everything from modifying the application to fix an error message that occurred when a worker tried to do a particular piece of work in the system to fixing typographical errors on system screens. The second largest number of fixes and enhancements involved the application's fiscal module (42); while this does not primarily impact case managers in the field, it is nonetheless significant because TFACTS is also the Department's fiscal system of record, such that it is appropriate for DCS to place priority to these issues. The Department also deployed fixes and enhancements involving Forms/Reports (27), Permanency Plan (13), and system performance (7), which were the remaining key issues identified by case managers. The other fixes/enhancements included 10 related to security and nine related to data quality, both of which are priorities for the Department under the Settlement Agreement. The remaining four were technical fixes that were necessary but did not impact end users. The fixes and enhancements deployed are detailed in the figure below:



A number of these fixes/enhancements reflect initiatives that the Department identified as underway in the April 2013 Report. Several were the result of the Department's purchase and

implementation of a performance-testing software called dynaTrace, which analyzes the performance of the application and identifies changes that can be made to improve performance; ¹⁵ a number of the security fixes/enhancements came out of the security review that the Department undertook to identify those issues; ¹⁶ and several of the Forms/Reports enhancements involved the Department transitioning its reporting from Crystal Reports to Jasper, which is the strategy the Department adopted to improve report performance. ¹⁷ This reflects that the approaches the Department identified that it would employ to address those issues have begun to bear fruit.

In addition to the fixes and enhancements, the Department has taken one other major step to address case managers' concerns about the speed and performance of TFACTS. Performance challenges can occur along the entire continuum, from the application itself to the network connection to the individual end user's computer. As of June 30, 2013, the Department completed a full replacement and upgrade of every Department employee's computer, upgrading them from what was likely fairly old technology to the latest available. These upgrades should also improve the end user experience, as case managers who formerly accessed TFACTS through computers that were out of date and slow will no longer face that barrier.

During the next several months, the Department has decided to prioritize six fairly significant and complex projects to enhance TFACTS. ¹⁸ For five of these prioritized enhancements, a combination of DCS OIT and contracted IT resources have been allocated to meet the projected level of effort required and schedules containing contemplated release dates established: ¹⁹

- Case Assignment. This is the work that is necessary to ensure accurate caseload reporting discussed above. DCS currently plans to deploy this functionality in four releases, with the last release anticipated in February and the enhancement to be fully functional by March 2014.
- *Permanency plan*. This work is to address case manager complaints about the complexity of the permanency plan in TFACTS, which, as discussed, is one of the most frequent complaints case managers raised about the system. DCS currently plans to

¹⁷ See April 2013 Report at page 44, footnote 54.

¹⁵ See April 2013 Report at page 44, footnote 53.

¹⁶ See April 2013 Report at page 5.

¹⁸ This list of priorities was set by the Management Advisory Committee (MAC), which is discussed in more detail in Section VI.

¹⁹ As development work proceeds on these enhancements, there may be adjustments in the release schedules to take advantage of efficiencies in combining and coordinating aspects of a particular release related to one enhancement with releases from one or more of the other enhancements. In addition, because these releases are specifically focused on better serving the needs of the field, the schedule may be modified to respond to any concerns that the field might express. OIT is particularly sensitive to the need to orient the field to new applications and does not want the field to be overwhelmed by the pace and volume of the releases.

- deploy this functionality in five releases, with the last release anticipated in June 2014 and the enhancement to be fully functional by July 2014.
- Fiscal enhancements. This project represents the continuation of the Department's efforts to enhance the TFACTS fiscal functionality, which has been the source of many challenges largely because the initial design sessions before implementation were deficient. The Department focused substantial effort on stabilizing the fiscal module through June 30 of this year through its contract with Compuware; this project will now enhance the stabilized module to better support the Department's fiscal work. DCS currently plans to deploy this functionality in five releases, with the last release anticipated in June 2014 and the enhancement to be fully functional by July 2014.
- Child Death Reporting Enhancements. These enhancements will modify TFACTS to better align TFACTS with the recently implemented revised Child Fatality Review process. DCS currently plans to deploy this functionality in two releases, with the last release anticipated in December 2013 and the enhancement to be fully functional by January 2014.²⁰
- *Incident reporting*. This project involves creating one unified incident reporting system for the Department, rather than the two systems that currently exist, revising types, subtypes, and severity levels of incidents to better reflect sound practice, improving usability, and revising and enhancing reporting. DCS currently plans to deploy this functionality in two releases, with the last release anticipated in January 2014 and the enhancement to be fully functional by February 2014.

For the one remaining prioritized enhancement, the *Well-Being/Health* enhancement, levels of effort have been established for this work; however unless resources are reallocated from other IT projects (or additional contracted resources otherwise made available), the development and release of these enhancements would occur subsequent to the completion of the other four. This enhancement is to re-design the manner in which TFACTS manages information pertaining to well-being and health to make that information more integrated and usable for staff. Once the development work is complete, the Department anticipates that implementation would occur in five releases over a four-month period.

As discussed in the April 2013 Report, the Department had, for the prior year, largely set priorities based on its response to its internal assessment and the Comptroller's report. Based on the nature of those reviews, however, those priorities often had little to do with fixing and enhancing TFACTS to improve the experience of case managers in the field or to provide program areas with additional accurate and timely data to manage the operations. This current

²⁰ While this enhancement will provide improved TFACTS reporting and support the new review process, the full implementation of the review process, including the tracking, analysis and reporting contemplated by that process, is not dependent on this enhancement.

set of priorities, however, focuses primarily on the needs of TFACTS end users, predominantly those of field workers and managers. As a result, this list of priorities is encouraging.²¹

Also encouraging are the results achieved by the collaborative work between OIT and the Child Abuse Hotline staff over the past year. OIT has also expended significant resources and effort working with the Department's Child Abuse Hotline (CAH) to address issues with and enhance the TFACTS module used there. CAH leadership reports that this work has streamlined the application, including reducing the amount of scrolling necessary and ensuring that screen tabs and fields follow the order in which staff complete the work; improved the appearance of the text and the screen, which has made it easier to read (and, according to CAH leadership reduced the number of staff requesting to leave early with eye strain-related headaches); and improved the application's performance, such that CAH staff report that it is much faster and rarely kicks end users out any more. CAH leadership praised what they felt was the exemplary customer service to the hotline that OIT has provided and continues to provide.

VI. Continued Efforts to Address Concerns related to OptimalJ

The TAC concluded in its evaluation that the Department's approach to addressing the OptimalJ concerns was reasonable and appropriate and developments over the past five months, including key staff hires discussed in Section II above, add to the TAC's confidence in the Department's capacity to address these increasingly diminished concerns.

As noted in the April 2013 Report, the Department faced three challenges arising out of the use of OptimalJ, a model-driven development environment: (1) that OptimalJ had not been used properly during the development of TFACTS, causing defects in the system; (2) that the fact that OptimalJ had been discontinued would prevent the Department from migrating TFACTS to a current, supported technology environment; and (3) that, because OptimalJ had been discontinued, the Department would be unable to find qualified staff to support TFACTS going forward.

In response to the first risk, the Department hired Compuware, the manufacturer of OptimalJ, to assess the models within TFACTS, fix any identified issues, and provide training to Department staff about the use of OptimalJ. That work is complete.

In order to address the second risk—that TFACTS could not be migrated to a current, supported environment due to OptimalJ—the Department has worked with Compuware and OIR to test whether TFACTS can be migrated, and all involved entities have concluded that it can. The

-

²¹ The TAC will monitor the progress on these enhancements closely so that it can provide regular updates to the Plaintiffs and the Court.

Department has developed and begun implementing a plan to effect that migration this fall, at the time the Department transitions its infrastructure to a new data center. As part of that process, the Department has also received OIR approval to migrate TFACTS to an environment that will support both OptimalJ and a potential replacement for OptimalJ simultaneously to allow for maximum flexibility in the Department's future planning. As noted in the April 2013 Report, this transition, once complete, will effectively extend the time that the Department has to address the OptimalJ issue for several years.

Finally, with regard to the third risk—that the Department did not have enough technical staff experienced with OptimalJ to support TFACTS in the future—the Department has taken two key steps. First, as noted, DCS has contracted with Compuware to provide training to Department staff on OptimalJ to enhance their ability to use it as a tool to maintain TFACTS. That increased skill and capacity mitigates the risk that DCS staff will not be able to use the tool going forward. And, second—and most significantly—by recruiting Mr. Jones, the Department has brought inhouse significant technical expertise with regard to both OptimalJ and TFACTS and now has the ability to train DCS technical staff on the use of OptimalJ internally without having to contract with an outside vendor. Both of those capacity-building exercises put DCS in a much improved position to manage the OptimalJ issues going forward.

VII. The Department's Approach to IT Governance, Data Quality, and the Use of Data as a Management Tool to Drive Toward Outcomes for Children and Families

One of the April 2013 Report's key findings was that the Department needed to "adopt a more holistic and coordinated departmental approach to information technology, data management, and data quality by aligning the work of information technology, data analysis, and field operations staff." Undergirding that finding was the fact that the Department had not yet adopted comprehensive approaches to IT governance, data quality/analytics, and the use of data to support and drive the Department's work with children and families.

A. IT Governance

At the time that the TAC issued its April 2013 Report, the Department referenced the Change Control Board (CCB) and the Management Advisory Committee (MAC) as its proposed core structures for IT Governance. As described at the time, the CCB, a committee of the IT leadership team (including the Director of IT Customer Service Support, whose intended role is as an advocate for end users) was envisioned to serve as an initial gatekeeper for requests to modify and enhance TFACTS. Requests approved by the CCB were then to be subject to review and approval by the MAC, with the MAC responsible for setting priorities among the various approved projects. The MAC, made up of the leadership at the Deputy Commissioner level, was envisioned as a vehicle for shared executive ownership of TFACTS, which would allow the IT

staff to take direction from the end users of the system. Approved and prioritized projects, including enhancements to TFACTS, would then receive the support of the Department's handful of project management staff.

In the April 2013 Report, the TAC commented that "while these management changes sound promising, they have been largely dormant during the past year while [OIT's] work priorities were set based on the Comptroller's Report and the DCS Self-Assessment. The Department should execute these processes vigorously and continuously assess them to ensure that they are having the desired impact of making the necessary modifications and enhancements to TFACTS to support the work of the field and the critical need for the field leadership to have accessible aggregate data reporting for management purposes."

Since the April 2013 Report, the Department has both moved forward on and modified this approach to IT governance. In late July, the Department convened a meeting of the MAC that was attended by the Commissioner, the Deputy Commissioners, other Department leadership, and the OIT management team. At that meeting the Department's Chief Information Officer reaffirmed the structure and operations of the MAC described above and presented attendees with a draft charter for the MAC. The charter explains that that MAC is to:

- provide Information Technology (IT) strategic decisions and direction;
- establish IT priorities;
- guide the IT planning;
- participate in IT project oversight; and
- provide a forum for all DCS Programmatic areas on issues related to IT.

Under the charter, the members of the MAC include the Commissioner of DCS, who serves as the Chair, all DCS Deputy and Assistant Commissioners, the Chief Information Officer, and two regional administrators or other field representatives, one each appointed by Child Programs and Child Safety.²² The draft charter also provides for the establishment of sub-committees called Program Review Committees (PRCs), representing each program area (referred to as the "line of business") that will be composed of senior staff from each area and chaired by the Deputy Commissioner overseeing that program area. The Department has identified five "lines of business:" Child Safety, Child Programs, Child Health, Juvenile Justice, and, based on feedback at the MAC meeting, a fifth PRC representing the supporting "lines of business" such as Fiscal, Legal, and Policy.²³ The PRC for Child Safety has already met; the Department anticipates that each of the PRCs will have met at least once prior to the next MAC meeting.

²³ The Department has also prepared a charter for the PRCs, which has been agreed to and executed by all members of the MAC as August 29, 2013.

19

²² As of August 29, 2013, the MAC charter has been executed by all members except the designated field representatives.

As the Department envisions it, staff members in each program area are expected to raise any IT-related needs or concerns with that program area's PRC. The PRC is expected to establish priorities for that work, which the Deputy Commissioner who chairs the PRC can then raise for consideration by the MAC at its quarterly meeting. The full MAC, under the leadership of the Commissioner, is responsible for reconciling all of the IT-related needs raised by all of the Deputy Commissioners in order to set priorities and sequencing for OIT staff and resources. In short, the MAC is the Department's current strategy to bring all of the program areas together to identify IT-related needs and to establish priorities for the Department's existing information technology staff and resources.

Based on conversations with Department leaders, other than the OIT leadership, who participated in the July 2013 meeting, there appears to be a consensus that the plan for the MAC's functioning is promising, but that only successful execution of the MAC and its associated meetings and processes—and, most importantly, timely delivery of the MAC-prioritized IT work by OIT over time—will build the communication and trust that is essential to a high-functioning, customer-service oriented information technology operation.

The TAC concurs with this view. In order to ensure that the MAC, the PRCs, and the associated systems and processes are successful, and, as a result, that the Department has a functional IT governance structure, DCS will have to remain committed to execute these processes over time. The charters are a promising start, but it is too early to tell if the MAC and the PRCs will become the effective governance structure the Department critically needs.²⁴

B. Reporting, Data Quality, and Data Analysis

As discussed in more detail in the April 2013 Report, the responsibility for data necessarily spans several organizational units: field operations, which is responsible for entering the data into the system and is considered the "owner" of the data; OIT, which is responsible for maintaining the hardware and software that store the data and for developing and running the reports that aggregate and display the data; and data analysis staff, whose role is to review and analyze the data to glean insight and actionable information from the data to share with program operations managers and leaders, who can then in turn use that information to improve agency performance.

With this level of complexity, it is critical to assign clear roles and responsibilities to each of those functional areas. Prior to December 2012, it was clear that OIT was responsible for

_

²⁴ As noted above, the MAC prioritized six projects for OIT to execute during the next several months. These are all significant pieces of work, and it will be critical for DCS to manage them closely to ensure that the schedule is adhered to and, if resource constraints arise, to bring in additional resources (whether employees or contracted vendors) as necessary. It will also be critical for OIT to share the deployment schedule with the MAC and the program areas at the outset and throughout the process to keep all involved updated on progress, challenges, and any necessary course corrections. A successful effort on these projects will likely go a long way to build the trust that is critical to a functioning governance structure.

hardware, software, and reporting; it was also clear that program operations staff were responsible for entering data into the system, but it was not clear who was responsible for ensuring that the data in the system were accurate and reliable, nor was it clear who was responsible for analyzing data to gain insight into agency performance. In December 2012—well after the accuracy and reliability of the Department's data became a significant concern—the Department explicitly assigned the responsibility to ensure that the data reported from TFACTS were accurate and reliable to the newly-created Analytics Unit within the Office of Performance Excellence.

Since that time, under the new administration, the Department has transitioned the responsibility to ensure the accuracy and reliability of data to OIT. With that allocation of responsibility, DCS has created and begun implementation of the "DCS Center of Excellence: Reports" (Reports Center), a structure and process designed to manage the identification, design, development, and deployment of TFACTS reports, including the responsibility to ensure the accuracy and reliability of the data in TFACTS. In this structure, each program area (or "line of business") will have a designated project manager who is responsible for shepherding that program area's projects through the Reports Center process. DCS has hired a seasoned project manager to oversee the implementation of the Reports Center process, which will include the following steps:

- Provisioning: the program areas will identify new reports that are necessary and raise
 them as a priority to the PRC, which in turn may raise them as a priority to the MAC.
 If the MAC determines that a report is a priority, DCS will proceed to the next step,
 requirements.
- 2. *Requirements*: OIT functional and project management staff will meet with appropriate program staff to develop the specifications of the report, *i.e.*, what data the report should aggregate and display.
- 3. *Development*: OIT report development staff, who are within DCS OIT's Data management Unit, will code the report program to meet the specifications.
- 4. *Quality Assurance*: OIT staff, including a newly-transferred former regional administrator with significant experience in the field and in the Analytics Unit, will review the coded report to ensure that it meets the specifications.
- 5. Customer Validation: OIT staff, again under the leadership of the newly-transferred former regional administrator, will meet with the appropriate program staff who were involved in developing the requirements to receive confirmation that the report meets specifications. This step will also include a validation of the accuracy and reliability of the data, which, according to DCS, will include verifying that the data are internally and externally consistent and accurately reflects the reality in the field. If any issues are identified during this review, the OIT project manager will be responsible for leading the effort to resolve those issues, including any issues regarding the accuracy and reliability of the data and necessary data cleanup.

- 6. *Configuration Management*: After the customer validates the report, OIT will "lock down" the report to prevent any changes that could impact the report's validity.
- 7. *Generation*: OIT will run the report.
- 8. *Distribution*: OIT will distribute the report through a scheduled distribution system to make it available electronically to appropriate, designated, and authorized staff.

This approach, while articulating the important elements of an orderly report design process, nonetheless raises two main concerns. First, the process is designed for new report requests or new requests for a significant redesign of an existing report; it does not explicitly include the significant volume of reports and data that the Department currently generates or the significant number of existing report requests that are in varying stages of development. As a result, there is an open question about how all of that work will be validated (when there are concerns about the accuracy and reliability of the data) and how the reports (or report modifications) already in the development process will be completed. The OIT leadership understands the need to have a more flexible approach to addressing those pre-existing reports and report requests that avoids what would otherwise be the significant possibility of duplicative or unnecessary effort and additional delays associated with running all currently pending work through the new process.

Second, the Department currently envisions that this process and the resulting reports will be tightly controlled to ensure that new reports are thoroughly vetted for accuracy and the purposes and caveats of the reports are clearly explained prior to wide distribution to avoid the potential for misinterpretation. Unfortunately, insufficient or inartful communication with the field may have led some staff to perceive the new process as an effort likely to reduce the field's access to information, rather than one designed to promote transparency and encourage staff to actively use data to understand their work and the broader context in which that work is being done.

As noted above, OIT has taken a number of steps to convey to the field that they "feel their pain" with respect to some of the TFACTS functionality challenges and both appreciate the need to prioritize enhancements that are important to the field and deliver promptly on some of those enhancements. However, OIT has been less attuned to the perception in the field that it is insufficiently responsive to requests from the field for data and reports that the field needs to manage and improve practice.

There continues to be strong sentiment that the field is expected to respond promptly to requests to engage in data cleanup to improve reporting accuracy, but that the needs of field staff for reports and analysis to support their work are still very low priority. There is still a perception, based on past experience rather than more recent performance, that requests for regular reporting or modifications of an existing report go on to a list and into some bureaucratic process from which a report is not likely to ever emerge. And for work groups that are in need of some data to inform a particular issue that they are trying to address, there is a perception that the OIT processes make that kind of quick and nimble "just in time" response unlikely, if not impossible.

This perception may have been reinforced by the dismantling of the Analytics Unit (without the concomitant transition of responsibility for data analytics to another unit) and the resulting loss of access to non-IT staff who were able to run special reports to help the field get some needed information quickly. The OIT leadership felt very strongly that TFACTS reports should be produced for the field by IT staff and viewed this non-IT generated reporting as problematic. The program staff, however, viewed this additional source of IT support not as a problem, but as a much appreciated solution to the insufficient attention paid by OIT to understanding and meeting the program staff need for data and analysis.

In fairness to OIT, their long term vision is for a system that provides both regular reports that the field needs and the kind of *ad hoc* information that work groups need, in most cases with the data readily accessed through a comprehensive reports catalog that allows staff to quickly find the data and retrieve reports that have anticipated the kinds of analysis needed, but in other cases, through an easy reports request and approval process that ensures that the data provided are accurate and that the data are used appropriately and not misinterpreted.

However, the IT leadership recognizes that it will take time to build that kind of robust reports catalog. Moreover, the IT leadership appreciates that the field, even with a robust reports catalog, still needs to have the ability to take the reports that are generated by IT and draw, combine, and display data from those reports to both understand problems and fashion improvement strategies. Typically support for that kind of use of data is thought of as a CQI function rather than an IT function, and some CQI coordinators have served that function to some extent in some of the regions. It is certainly worth considering providing the Department's CQI staff with whatever additional support, training, or coaching that they might need to serve that function.

C. The Department's Use of Data as a Management Tool

While developing reports to show accurate and reliable data is a critical first step, it is nonetheless merely a precursor to the ultimate objective of using that data to improve system performance to better help children and families to achieve meaningful outcomes. As a result, many child welfare agencies are working to become more data-driven—*i.e.*, to use the accurate and reliable data reported from their IT systems to inform their day-to-day work. While much of the focus of the Department has been on developing and refining specific reports, the Department leadership recognizes the importance of staff being able to understand the questions that each of the individual reports are designed to answer in the context of the broader mission of the Department, the core outcomes it is seeking to achieve, and the key measures of system performance. Understanding the inter-relationship between and among various reports and

understanding how and when to use the reports is key to the "data-driven culture" that is the vision of the current leadership.²⁵

As a necessary first step toward making this data accessible and understandable, the Department's IT staff has committed to develop a reports catalog (with an accompanying glossary) that, when complete, will serve as a readily accessible resource for staff providing them with a clear understanding of all of the reports that are available to support the Department's work with children and families and the overall objectives of the reform.

The Department recognizes that the reports catalog has to be more than simply a list of report names. Creating a catalog that serves as a guide to understand what each report is measuring, what questions it can be used to answer, and how that report and those measures relate to other reports and other measures, is a complex but important undertaking.

The TAC has suggested that the Department consider initially organizing the catalog around a set of broad questions that go to the core of the Department's mission and around a set of key indicators of system performance that are shared by Department leadership. Among these broad questions might be the following:

- How successful is the Department in providing children in foster care with stable, supportive, home-like settings that preserve healthy contacts with family, friends, and community?
- How successful is the Department in meeting the safety, health, developmental, emotional, and educational needs of children in foster care?
- How successful is the Department in helping children achieve permanency, either through safe return to their parents or other family members or through adoption?

The key indicators of system performance might include data related to:

- the basic dynamics of the population of children in foster care, including the number and demographics (including age, gender, race/ethnicity) of youth entering care, in care, and exiting care, including cohort data that allow the Department to understand and respond to trends over time;
- measures of quality practice, including both TFACTS data (*e.g.*, reports on face-to-face visitation, timeliness of completion of Child and Family Team Meetings, and the like) and data generated by the Quality Service Reviews (particularly those going to the core "practice wheel" elements);
- workforce capacity, such as the caseload reports and staff turnover data; and

²⁵ As part of that vision the Department has commenced a "ChildStat" initiative that involves regular targeted reviews with regional leadership of individual cases. To date, however, these reviews have not involved quantitative, aggregate data; they have focused instead more on qualitative assessments of practice.

• child protective services performance, including the volume, timeliness, and findings of investigations, as well as the range of Child Abuse Hotline data (call volume, dropped calls, and response times).

The Department is now well positioned from a data availability standpoint to create the "data-driven culture" that the Commissioner has envisioned. The longitudinal data currently available from TFACTS, primarily captured in the reports available to the Department through its collaboration with Chapin Hall, provide the Department with the ability to understand system performance, to identify opportunities and develop strategies to improve, and to track and assess the impact of implementation of those strategies over time. The "point-in-time" data currently available from TFACTS provide the Department with a wealth of information related to day-to-day program management, including supervision of key aspects of front-line case practice. And this aggregate reporting is further enhanced by the insights into system performance and child and family status provided by the Quality Service Reviews.

The challenge for the Department is how to make this wealth of data readily accessible and understandable to managers and field staff and how to help them use the data to monitor, support, and guide day-to-day case practice and to design and implement strategies to improve longer term outcomes.

Under the current structure, it is not clear to the TAC who has the responsibility for meeting this challenge. OIT has, as discussed above, begun to conceptualize a reports and data validation process. That process, however, does not appear to include any work beyond ensuring that the data are accurate and reliable. There does not appear at this point to be a specific provision within either OIT or the Quality Assurance Division for the type of data analytics that involves taking the various sources of reporting, interpreting and understanding the data, and helping develop from that work actionable insight that can be shared with the program areas and used as a tool to improve the Department's performance. The current Commissioner and Deputy Commissioners are experienced at using data to manage, and it may be that they have staff in their respective divisions or offices that can provide sufficient data analytics support both to them and to the regions. But, however it is structured and provided, that data analytics function would seem to be essential to the Department's effort to become more data driven and outcome focused.

VIII. Conclusion

Since the April 2013 Report, the Department has continued to respond to the challenges around TFACTS in a thoughtful and appropriate fashion. The Department has pivoted away from prioritizing work in response to external considerations and toward prioritizing work that is critical to DCS field operations, and has begun implementation of an IT governance structure that, if executed rigorously over time, should continue that progress.

The Department has also made the important commitment to build a "data-driven culture." However, this work is still in its formative stages and does not yet include a clearly articulated vision regarding the allocation of responsibility for analyzing data to glean actionable insight that can be used to drive practice improvement. There is also a risk that the Department's Reports Center process, if administered rigidly, may operate as a barrier to field operations receiving and using the data they need to do their work more effectively and efficiently.

The current DCS leadership correctly views the creation of a "data-driven culture" as a critical component of the Department's efforts to improve outcomes for children and families. Notwithstanding the important ongoing work to address defects and deploy enhancements and make TFACTS more responsive to the needs of the field, the Department now has a data system with the capacity to support that "data-driven culture." With a concerted effort over the coming months focused on providing data analytics support to the field, the Department can take greater advantage of that capacity and increasingly ensure that field operations and leadership have the data, information, and insight necessary to improve the Department's performance.